CIMSS VISITview Satellite Training

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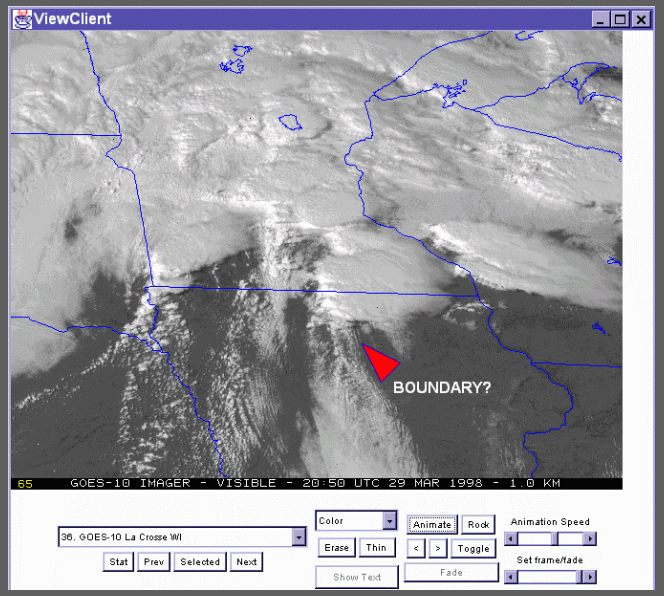

2004 Satellite Direct Readout Conference

What is VISIT?

VISIT - Virtual Institute for Satellite Integration Training

- CIRA – NOAA Cooperative Institute for Research in the Atmosphere at Colorado State University
- CIMSS – NOAA Cooperative Institute for Meteorological Satellite Studies at University of Wisconsin-Madison
- Links to World Meteorological Organization

What are CIRA and CIMSS ??

NOAA Cooperative Institutes funded by NOAA/NESDIS and NOAA/NWS (via VISIT)

- CIRA – Primarily involved in GOES Imager and new Polar Satellite applied research
- CIMSS – Primarily involved in GOES Sounder and new Polar Satellite applied research

CIMSS/CIRA/NESDIS/COMET Collaborators

Tom Whittaker, Scott Lindstrom and Scott Bachmeier
Cooperative Institute for Meteorological Satellite Studies (CIMSS) - Madison, Wisconsin

Jim Purdom, Dan Bikos and Dan Lindsey
Cooperative Institute for Research in the Atmosphere (CIRA) - Ft. Collins, Colorado

Mark DeMaria,John Weaver and Ray Zehr (NESDIS)
Ft. Collins, Colorado

Patrick Dills and Sherwood Wang
Cooperative Program for Operational Meteorology, Education and Training (COMET) - Boulder, Colorado

Other Collaborators

- Jeff Wilson (Australia), Vesa Nietosvaara (Finland), WMO RMTCs
- NWS Warning Decision Training Branch (WDTB)
- NWS Science and Operations Officers - SOOs
- Numerical Weather Prediction and Climate Teams
- NWS Interactive Forecast Preparation System Team
- NESDIS Office of Research and Applications

What is VISITview?

Platform independent distance learning software that allows instructor to connect live with many students to view same series of images containing graphics, text and annotations

Developed at CIMSS with help from VISIT team

What is VISITview?

- Evolving since 1999
- Focused to meet needs of NOAA's National Weather Service real-time teletraining program
- Supports both live and recorded sessions
- Enables real-time collaborations
- Includes an integrated lesson builder
- Freely available & sponsored by NOAA, CIMSS, CIRA

www.ssec.wisc.edu/visitview/

VISIT

- Training Sessions
- The VISIT Program
- VISIT People
- FAQ
- Links / Tutorials
- RAMSDIS Online

IST

Colorado State University CIRA

VISITview™ Home Page

page created 11/4/1998

last software update 4/30/2004

Updated!! Site Index & Quick Reference

VISITview™ is a **teletraining** and real-time **collaboration** tool developed for the National Weather Service VISIT program to meet the needs of science training of their forecasters. While it emphasizes functions needed to realize these goals, it can be used for any lawful application where image animations, zooming, colorizing, and the like are needed. It uses an integrated whiteboard/blackboard and provides for a chat function as well as page-by-page quizzes and external links, to connect instructor(s) to many students. You may also record voice and all "annotation" activities for synchronized playback has been added to VISITview™'s capabilities.

NWS Teletraining	Real-time collaborations	Just looking??
VISIT project homepage		Try it out - join a live
Quick-Start for VISIT		

NWS Teletraining

VISIT project homepage

Quick-Start for VISIT Teletraining

On-line VISITview™ lessons

Viewing Recorded Lessons

Updated!! Instructors' tips for making better lessons

Real-time collaborations

World-wide satellite imagery

GOES Derived Products

RAMSDIS On-Line database

How is it done?

Just looking??

Try it out - join a live session

Updated!! Using the controls

Introduction

Slides from various Training & Presentations

FAQ, Terminology, Etc.

Old words with new definitions

Sample lesson installation instructions

Frequently Asked Questions

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On-line, step-by-step tutorial

Voice & annotation recording

Details, details, details

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Setting up a server

HTML parameters

Download VISITview™ !!

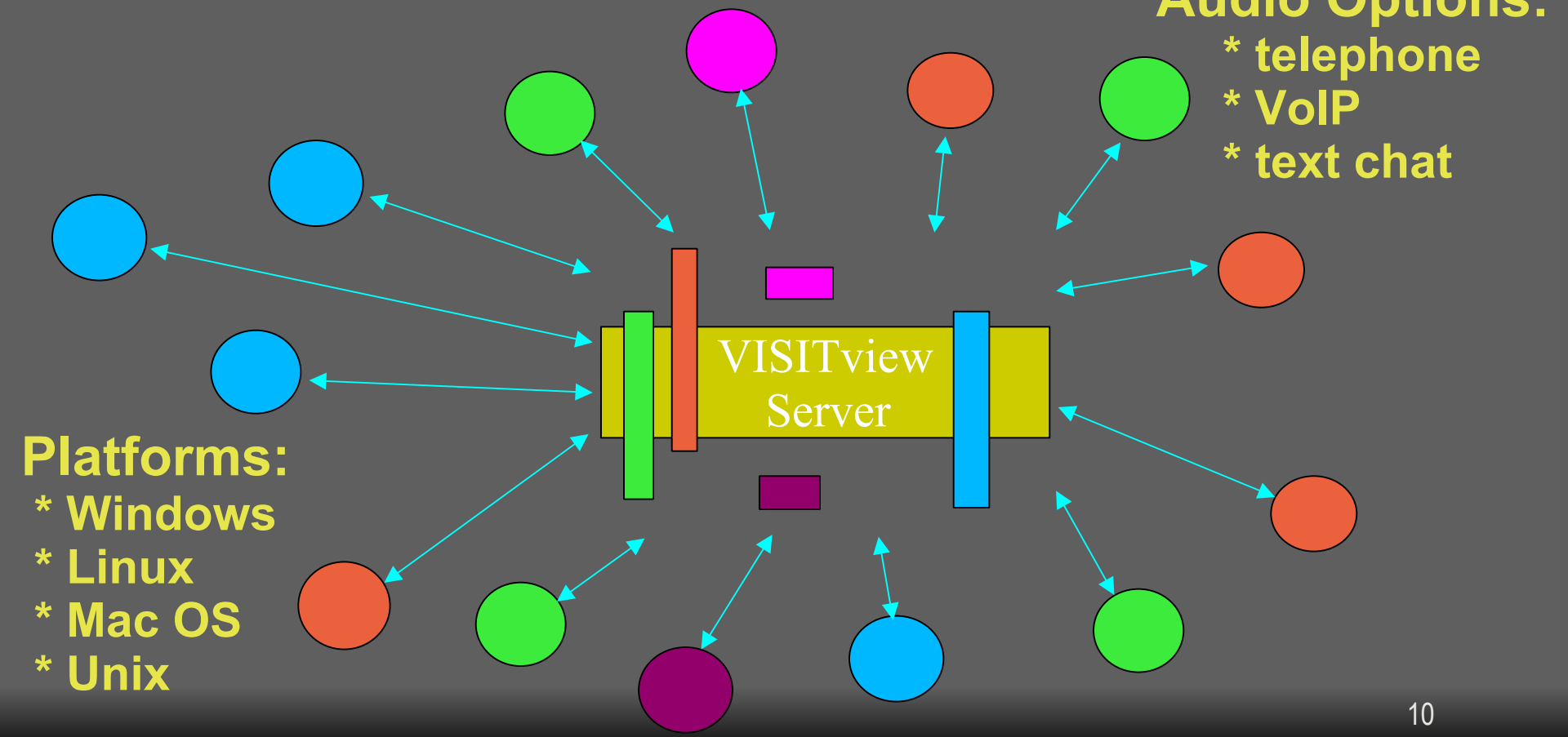
What are all these files?

vvinstall.exe - the contents of *visitpack.zip* but installed with InstallAnywhere® which creates a folder with icons to launch common processes (~9.7MB) - Windows 95/98/NT/2K/XP only. (Or via FTP.)

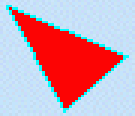
visitpack.zip - all the code and template files you need (~8.5MB) (Or via FTP.)

visitcode.zip - just the Java class files - useful for updates (~154KB)

VISITview Client-Server Topology

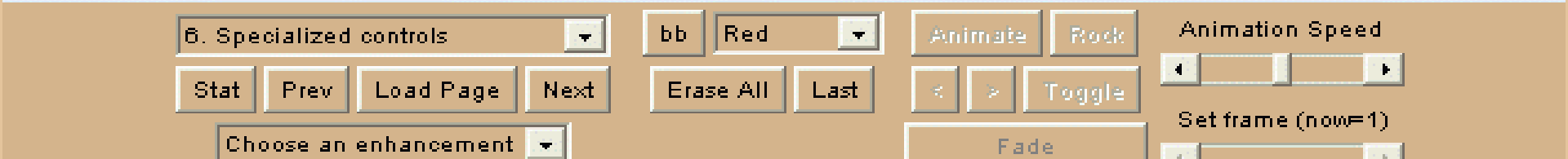


Customary controls

- Point-click Big Red Pointer 
- On-screen drawing – freehand, rectangles, circles, and straight lines with optional arrowhead
- Type text on screen or use pre-defined phrases
- User-selected color for drawing and text
- Zoom
- Always-available *help screen* (via ALT+?)

Specialized controls

- Animations (start, stop, speed, motion)
- Step & toggle between frames
- Fading between images
- Colorizing ("enhancement") images on-the-fly
- Picture-in-picture ("portals") and overlays during animation
- Built-in "quiz" feature to help keep students awake
- Text 'chat' window



Teletraining Courses/Sessions Outlines/Student Guides

- Every Session has student guide:
  - Introduction/Goals/Level
  - Prerequisites
  - Installation Instructions
  - Training Session Options:
    - Interactive (live), Web-based with talking points, Web-based with VISITview, local VISITview, local or Web-based with recorded instructor audio and annotations
  - References/Additional Links
  - Information Contacts

VISIT

Virtual Institute for Satellite Integration Training

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VISIT is a joint effort involving NOAA-NESDIS Cooperative Institutes, the National Environmental Satellite Data and Information Service (NESDIS), and the National Weather Service (NWS). The primary mission of VISIT is to accelerate the transfer of research results based on atmospheric remote sensing data into NWS operations using distance education techniques.

Teletraining Calendar, Signup and Installation

What's New? VISITview software homepage Feedback

Currently Offered Teletraining Sessions sorted by Professional Competency Unit (PCU):

IST PCU 9: Using AWIPS in the forecast process

- An Application of Pattern Recognition to Medium Range Forecasting
- Lake-effect snow
- An Ingredients-Based Approach to Forecasting Winter Season Precipitation
- HPC Medium Range Forecasting
- Enhanced-V Cloud Top Signature

IST PCU 6: Using Satellite Data and Products

- Tropical Satellite Imagery and Products
- GOES Sounder Data and Products
- NEW Fog Detection and Analysis with Satellite Data
- NEW POES Tropical Rainfall Potential
- NEW Subtropical Cyclone Analysis with Satellite Data

IST PCU 7: AWIPS Multi-source Data Displays

- Mesoscale Analysis of Convective Weather Using GOES RSO Imagery
- NEW Cyclogenesis: Analysis utilizing Geostationary Satellite Imagery

IST PCU 2: Using Lightning Observations

- Lightning Meteorology II
- Lightning Meteorology I

NWP PCU 2: Understanding Current Characteristics of Operational NWP Models

- Ensemble Prediction Systems

Miscellaneous VISIT Teletraining

- Natural Disaster Information Cards
- NEW Meteorological Uses of ACARS Data

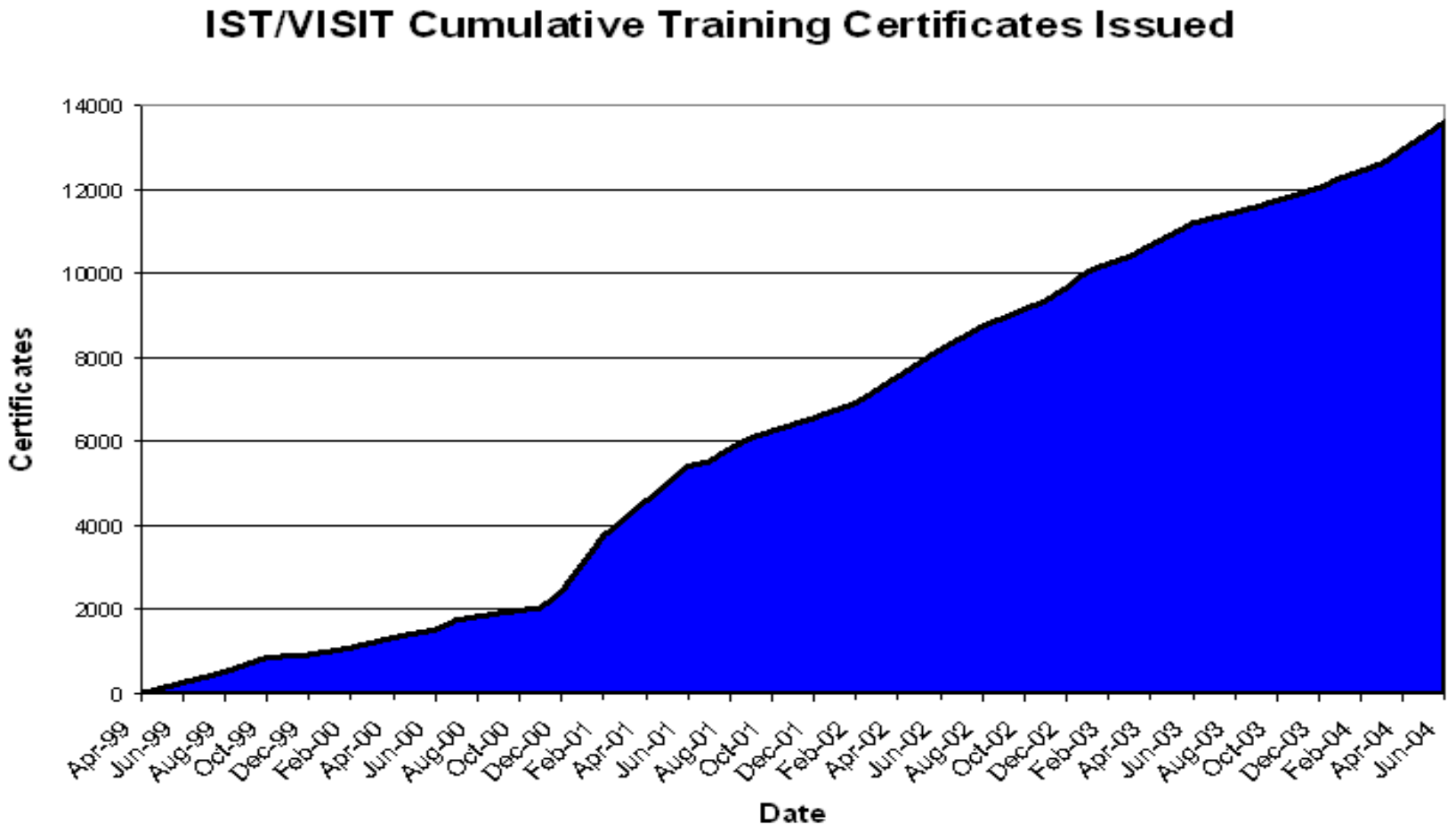
June 2004

Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday
		1	2 AWIPS Cloud Height / Sounder Retrievals 9:30 AM MDT 15:30 UTC ======FULL====== RAH, EPZ, ARX, EYW, STO, DLH, CLE, EKA	3	4 Mesoscale Convective Vortices 9:00 AM MDT 15:00 UTC ZBW, SJU, LSX, HPC	5
6	7 Mesoscale Convective Vortices 9:00 AM MDT 15:00 UTC ILX, ARX, CTP, HNX, EYW	8 Lightning Met I 9:30 AM MDT 15:30 UTC ======FULL====== MTR, VEF, RAH, OTX, PQR, AFC, JKL, JAN, EYW, STO	9 Lightning Met II 9:30 AM MDT 15:30 UTC ======FULL====== MTR, VEF, RAH, AJK, OTX, AFC, TFX, JKL, JAN, STO Ten Principles of Climate Monitoring 12:00 PM MDT 18:00 UTC WRH, EKA, IND, SJU, JAN, FGF, REV, SLC	10 AWIPS Cloud Height / Sounder Retrievals 1:30 PM MDT 19:30 UTC RAH, JKL, AFC, TFX, JAN, EWX, EYW, ILN	11 Water Vapor Imagery 9:00 AM MDT 15:00 UTC ARX, ABQ, HNX	12
13	14	15 RSO III Part 1 9:30 AM MDT 15:30 UTC	16 RSO III Part 2 9:30 AM MDT 15:30 UTC	17 Mesoscale Convective Vortices	18 Enhanced-V 9:00 AM MDT 15:00 UTC	19

Using VISITview

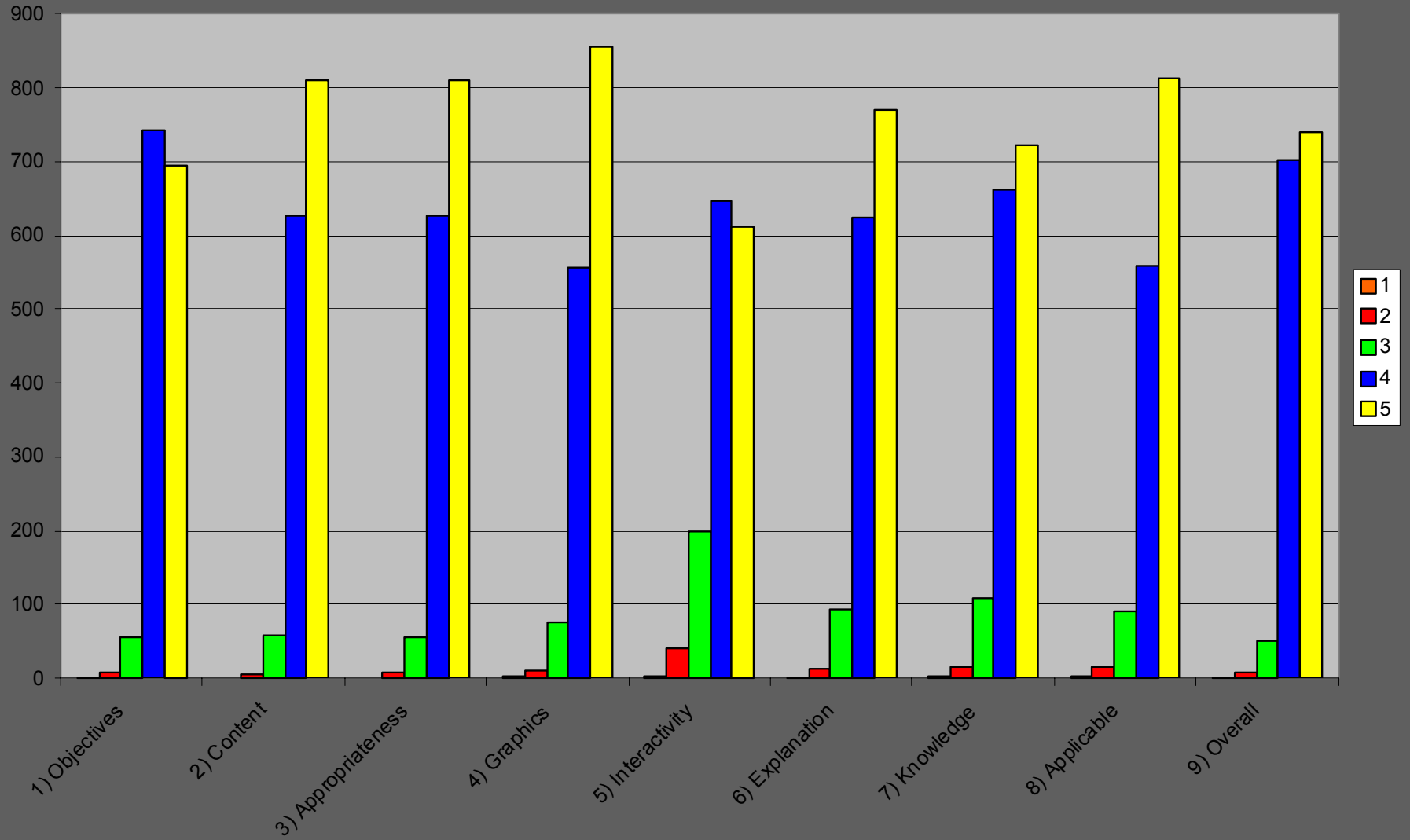
Over 820 Training Sessions Done

More than 13,500 Training Certificates Issued



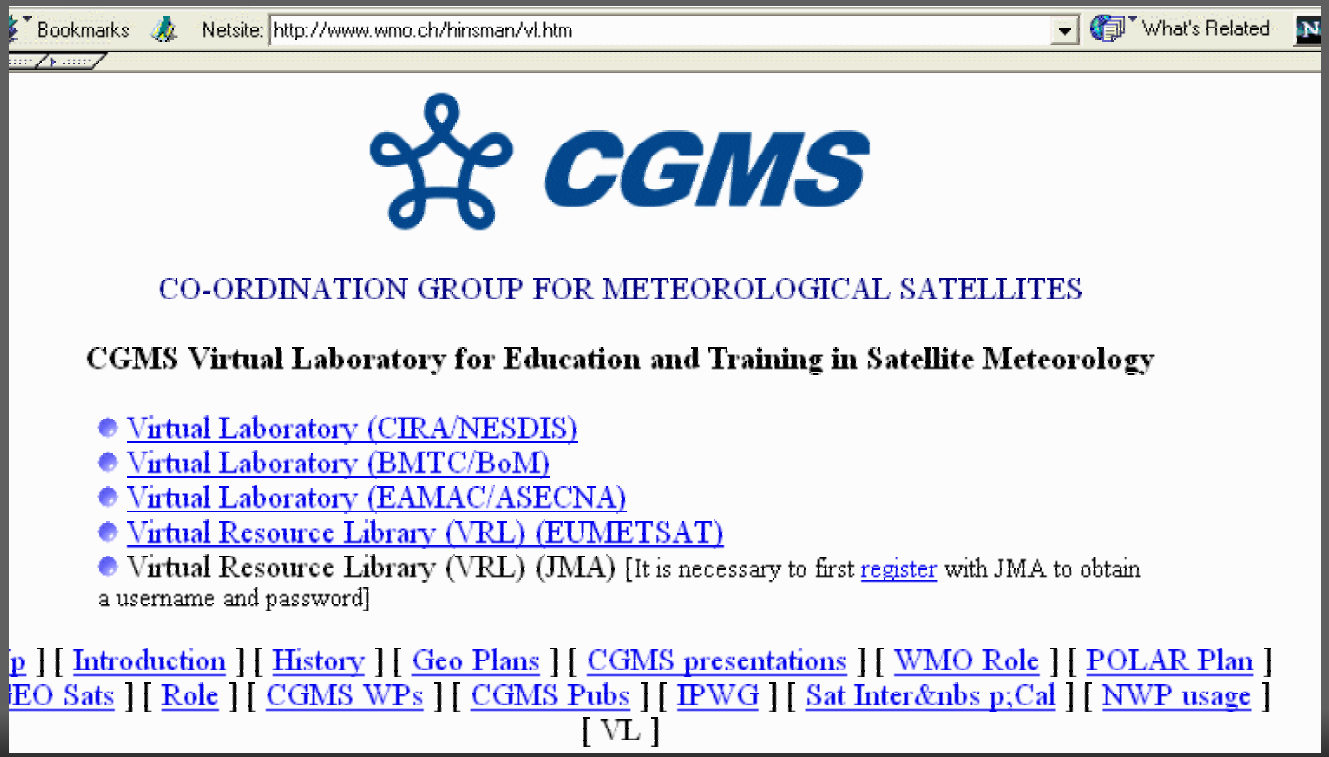
	Sessions	Number of offices attending (signups)	Certificates Issued
Total	822	4165	12997
Enhanced-V	43	162	448
Detecting Boundaries	12	62	226
Detecting LTO boundaries at night	17	67	186
CONUS CG Lightning Activity	16	86	285
Using GOES RSO	26	83	263
Tropical Satellite Imagery	8	48	138
GOES Enhancements in AWIPS	9	47	109
Diagnosing Mesoscale Ascent	21	83	252
Applying Mesoscale Tools	5	54	202
Diagnosing Surface Boundaries	24	106	307
QuikSCAT	11	42	135
Lake-Effect Snow	15	64	210
NDIC	19	40	105
Lightning Met 1	58	303	1053
Precip Type	5	44	186
Pattern Recognition to MRF	10	70	277
HPC Medium Range Forecasting	15	101	335
Ingredients based Approach	36	198	626
Model Initializations	20	124	440
NWP Top 10 Misconceptions	27	148	532
GOES Sounder	20	84	200
GOES High Density winds	7	31	102

VISIT Evaluation Results (through May 10, 2004; 1501 evaluations)



Using VISITview

- Other agencies (Dept of Defense) and Countries (Canada, Australia, Finland, Barbados, Costa Rica, etc.)
- WMO Virtual Laboratory for Education and Training in Satellite Meteorology

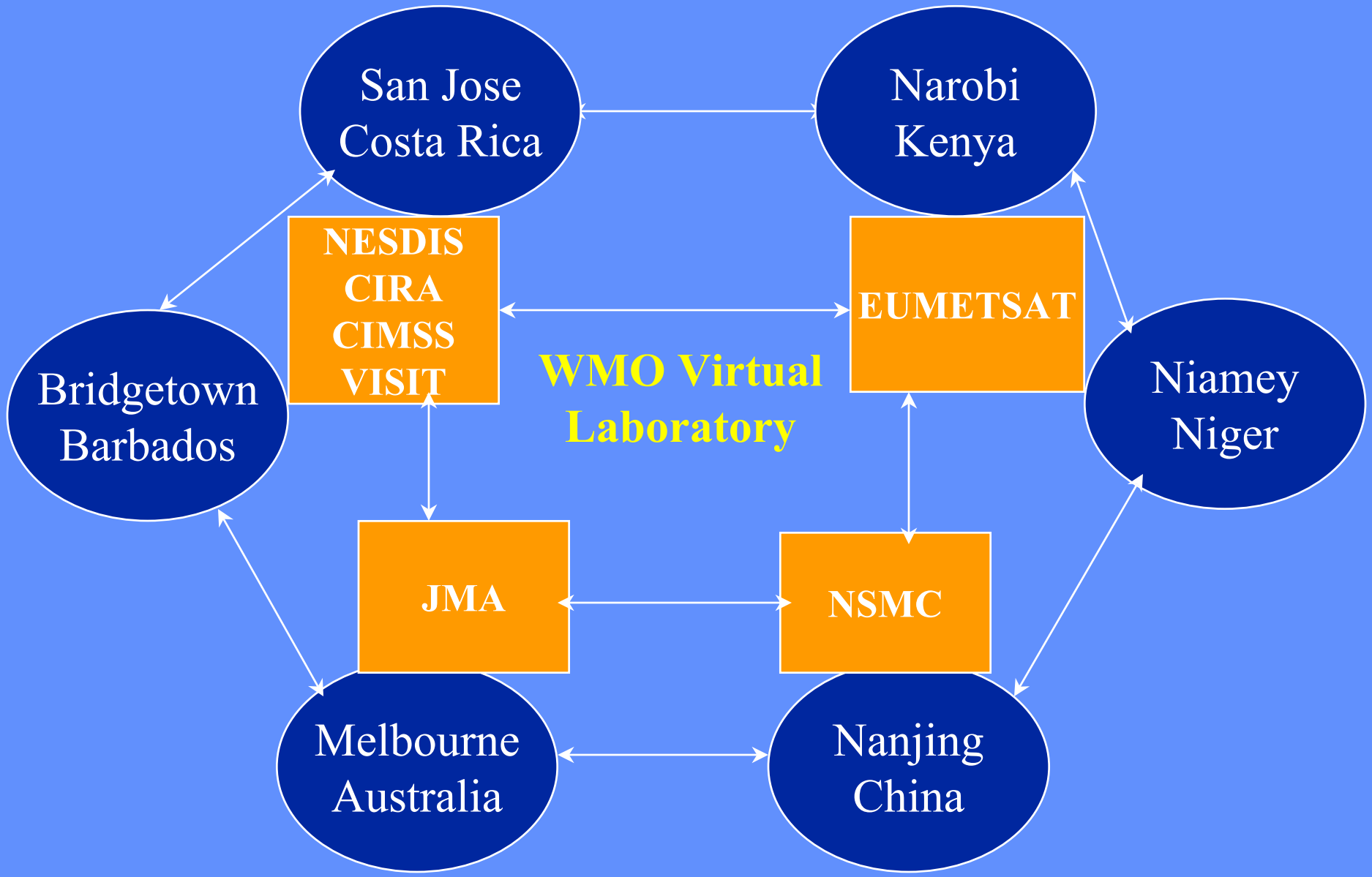


WMO Virtual Laboratory (VL) for Satellite Education…

WMO VL is a global network of specialized training centres created to meet user needs for increased skills and knowledge in using satellite data.

Support WMO Strategy to Improve Satellite System Utilization by providing access to training and educational material, software and expertise on how to the utilize data, case studies and near real-time data.

Collaboration is the Key to Success



WMO Virtual Laboratory for Satellite Data Utilization

VISIT program supports WMO VL through use of VISITview for teletraining and collaborations:

WMO Workshops at:

- Nanjing China – December 2000
- Melbourne, Australia – May 2002
- Niamey, Niger - July 2003
- Barbados – December 2003
- Buenos Aires, Argentina – May 2004

NWS Teletraining

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www.ssec.wisc.edu/visit/satcollab.html

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VISIT Collaborations with Global Real-Time Weather Satellite Imagery

CIMSS

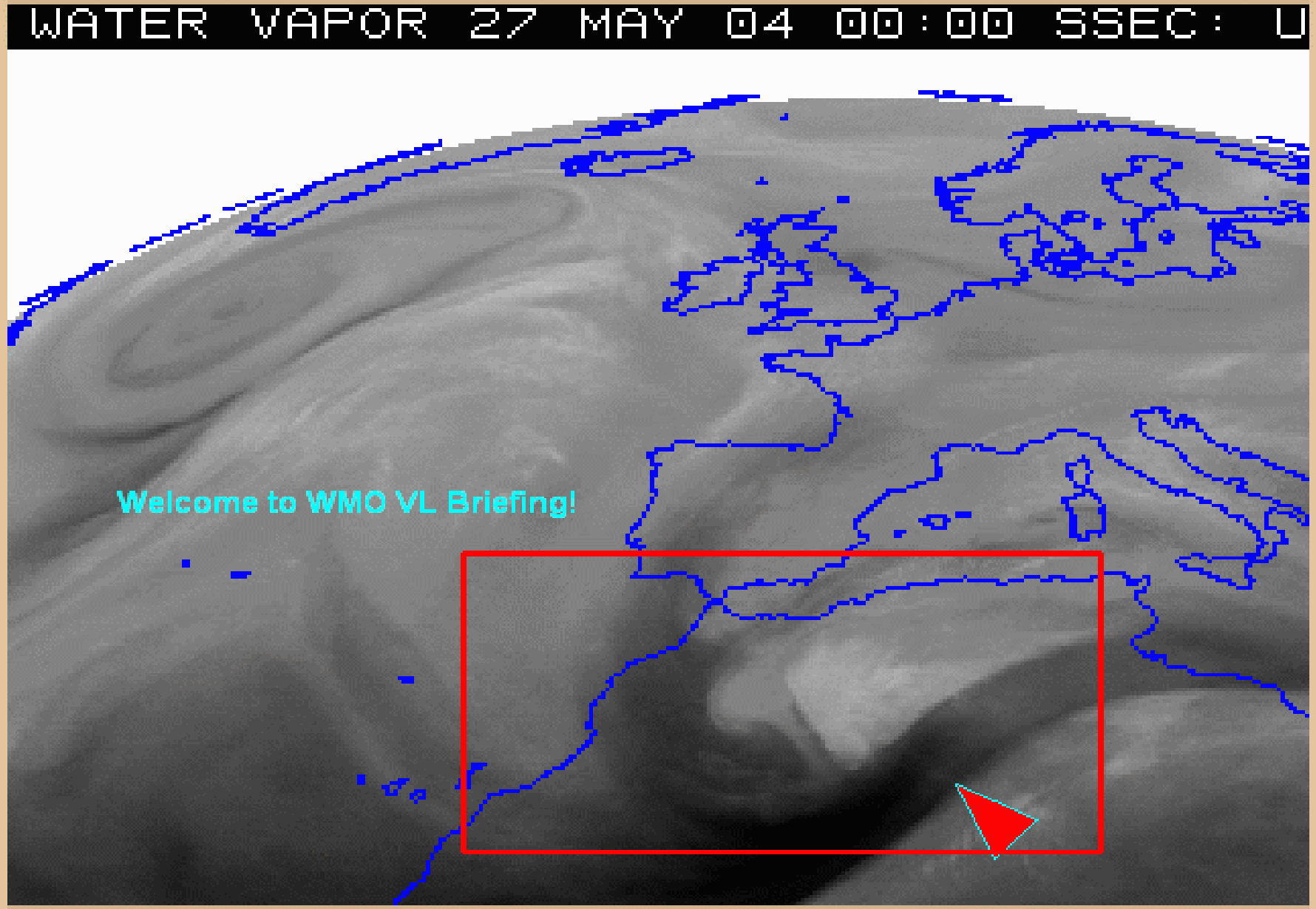
This page is your link to realtime collaborations with weather satellite imagery from around the world as received and processed by the SSEC Data Center at the University of Wisconsin-Madison, using VISITview - a teletraining and collaboration tool developed for NOAA at SSEC/CIMSS.

Read this first!

- Click one of the links below, and after the applet comes up you will see a Dialog Box where you may choose to join an existing collaboration (**be sure it is for the same data type, though!!**) or start your own.
- The VISITview controls are at the bottom of the display. To get started, click the red **Next** button. (A complete description of the controls can be found here.)
- The images are large, but we have created a viewing 'portal' that is 640x480, so after the image sequence is loaded, you can roam around the image by **holding the Shift key while 'dragging' the mouse**. (During a collaboration, after you roam around and release the mouse button, everyone's screen changes to that view.)
- For some of the collaborations, we have included high-quality images (the page labels say **Hi-Q** on them). These images are much better for zooming and colorizing (enhancing):w
- A **Quick Help** screen is available by keying **Alt** + ? (hold Alt key and click the ? key). Click any other key to remove this.
- When you're collaborating with VISITview, any actions you do on the screen will be shown on everyone elses. So...pick a satellite, call your friends, and ...

Enjoy!!

GOES East
GOES West
GOES Derived Products
GOES Pacific
Meteosat-5
Meteosat-7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Welcome to WMO VL Briefing!
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Last
Animate
Rock
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Toggle
Fade
Animation Speed
Set frame

VISITview - Opportunities

Expanding VISITview - Teletraining & Collaborations

NOAA/EUMETSAT Joint Training Activities

WMO Virtual Laboratory Focus Group –

- Barbados & Costa Rica
- Other RMTCs
- World Wide RMTC Training Event

Summary

VISITview teletraining and collaboration tool:

- Freely available & supported by NOAA
- Gets training to users wherever they are
- Maximizes use of resources
- No technical boundaries
- Opportunities –

  WMO, NOAA, EUMETSAT…

Questions???

- Send email to:

  visitview@ssec.wisc.edu
- To join mailing list send email to:

  visitview-list-subscribe@ssec.wisc.edu
- VISITview Homepage
  www.ssec.wisc.edu/visitview/